

| Notice of Allowability | Application No. | Applicant(s) | |
|-------------------------------|------------------------|---------------------|--|
| | 10/052,910 | BEASLEY ET AL. | |
| | Examiner | Art Unit | |
| | Duc C. Ho | 2665 | |

-- *The MAILING DATE of this communication appears on the cover sheet with the correspondence address--*

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTO-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. This communication is responsive to the amendment filed 11-17-05.
2. The allowed claim(s) is/are 2-9, 11-19, 29, 32-37, 30-31, and 38. Renumbered 1-27, respectively.
3. Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some* c) None of the:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) hereto or 2) to Paper No./Mail Date _____.
 - (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. Notice of References Cited (PTO-892)
2. Notice of Draftperson's Patent Drawing Review (PTO-948)
3. Information Disclosure Statements (PTO-1449 or PTO/SB/08),
Paper No./Mail Date 6-10-03
4. Examiner's Comment Regarding Requirement for Deposit
of Biological Material
5. Notice of Informal Patent Application (PTO-152)
6. Interview Summary (PTO-413),
Paper No./Mail Date 12-01-05.
7. Examiner's Amendment/Comment
8. Examiner's Statement of Reasons for Allowance
9. Other _____.

EXAMINER 'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Steve Forbes on 02-25-05.

The application has been amended as follows:

In the claims:

Claim 4, line 3, "stations" has been changed into --- station ---.

Claim 4, line 23, "or" has been changed into --- of ---.

Claim 12, line 1, "The method of claim 11 4" has been changed into --- The method of claim 11 ---.

Claim 13, line 1, "The method of claim 11 4" has been changed into --- The method of claim 11 ---.

Claim 14, line 1, "The method of claim 11 4-wherein" has been changed into --- The method of claim 11, wherein ---.

Claim 15, line 1, "The method of claim 11 4-wherein" has been changed into --- The method of claim 11, wherein ---.

Claim 16, line 1, "The method of claim 11 4-wherein" has been changed into --- The method of claim 11, wherein ---.

Claim 17, line 1, "The method of claim 11 4-wherein" has been changed into
--- The method of claim 11, wherein ---.

Claim 18, line 1, "The method of claim 11 4-wherein" has been changed into
--- The method of claim 11, wherein ---.

Claim 19, line 1, "The method of claim 11 4" has been changed into --- The
method of claim 11 ---.

Reason for Allowance

2. Regarding claim 2, the prior art fails to teach or suggest a system for wirelessly exchanging communications with at least one mobile unit, the system comprises a system controller coupled to the first and second base station units and to the network, wherein the system controller includes a Dynamic Host Configuration Protocol ("DHCP") server, wherein requesting a unique session address includes mapping the generated IP address to the unique BD_ADDR, wherein the unique BD_ADDR is a six byte value, and wherein mapping includes generating a lower three bytes of the six bytes of the unique BD_ADDR based on the generated IP address, in combination with other limitations.

Regarding claims 3, the prior art fails to teach or suggest a system for wirelessly exchanging communications with at least one mobile unit, the system comprises a system controller coupled to the first and the second base station units and to the network, wherein the first and second base station units include a radio environment management entity and a mobile protocol, and wherein at least the first base station

units is further configured for: monitoring a quality of the communications link with the mobile unit; at the radio management entity, determining that the quality of the communications link has dropped below a threshold and generating a handoff request message; at the mobility protocol, receiving the handoff request message, sending a suspend message to the system controller to suspend transmissions for the mobile unit, and sending a handoff acceptance inquiry message to the mobility protocol of the second base station unit; receiving a response from the second base station unit; forwarding the link context data to the second base station unit exchanging primitives between the mobility protocol and the mobility management entity to clear the communications link at the first base station unit; at the mobility protocol, sending a link cleared message to the radio environment management entity; and at the mobility protocol, sending a resume data transmissions message to the system controller, wherein, in response thereto, the system controller sends data for the mobile unit to the second base station unit , in combination with other limitations.

Regarding claims 4-9, the prior art fails to teach or suggest in a network, a method for wirelessly exchanging communications with at least one mobile unit, wherein the network includes first and second base station units coupled to the network, the method comprises a step at the first base station unit, obtaining a unique session identifier for the communication with the mobile unit, wherein the unique session identifier is a virtual Bluetooth device address having a six byte value, and wherein a lower three bytes of the six bytes of the unique BD ADDR are generated by the first base station unit of the network and the three bytes fall within a range that is less than a

total range available under the three bytes, in combination with other limitations, as specified in the independent claim 4.

Regarding claims 11-19, the prior art fails to teach or suggest in a network, a method for wirelessly exchanging communications with at least one mobile unit, wherein the network includes first and second base stations units coupled to the network, the method comprises a step in which a system controller coupled to the first and second base station units and to the network, wherein the second base station is configured to determine that the communication link with the mobile unit is lost or cleared and provide a message to the system controller, and wherein the system controller releases the unique session identifier for future use in response to the received message, in combination with other limitations, as specified in the independent claim 11.

Regarding claims 29, and 32-37, the prior art fails to teach or suggest in a picocellular communications network, wherein at least one mobile unit communicates with at least a portion of the network, an apparatus comprises a stationary wireless network access point coupled to the picocellular communications network, wherein the access point includes a memory and is configured for handing off to the neighboring stationary wireless network access point the communications link and link context associated with the mobile unit, wherein the handing off is performed without assistance of the mobile unit, and wherein the link context data includes values under upper Bluetooth protocol or Internet Protocol layers above a Host Controller Interface ("HCI"), and at least one lower Bluetooth protocol layers below the HCI, in combination with other limitations, as specified in the independent claim 29.

Regarding claim 30, the prior art fails to teach or suggest in a picocellular communications network, wherein at least one mobile unit communicates with at least a portion of the network, an apparatus comprises a system controller coupled to the network access point; a gateway router coupled to the system controller and the network access point, wherein the network access point forms at least a part of a first subnet; a backbone router coupled to the gateway router and to the neighboring network access point, wherein the neighboring network access point forms at least a part of a second subnet; and a point of presence coupled to the backbone router, wherein the point of presence and the mobile unit form at least part of a mobile unit virtual subnet, in combination with other limitations.

Regarding claim 31, the prior art fails to teach or suggest in a picocellular communications network, wherein at least one mobile unit communicates with at least a portion of the network, an apparatus comprises a stationary wireless network access point coupled to the picocellular communications network, wherein the access point includes a memory and is configured for handing off to the neighboring stationary wireless network access point the communications link and link context associated with the mobile unit, wherein the handing off is performed without assistance of the mobile unit, and wherein the unique session identifier is a Virtual Bluetooth device address, in combination with other limitations.

Regarding claim 38, the prior art fails to teach or suggest in a picocellular communications network, wherein at least one mobile unit communicates with at least a portion of the network, an apparatus comprises a stationary wireless network access

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point coupled to the picocellular communications network, wherein the access point includes a memory and is configured for handing off to the neighboring stationary wireless network access point the communications link and link context associated with the mobile unit, wherein the handing off is performed without assistance of the mobile unit, and wherein the network access point is configured to generate a first unique mobile unit ID that is associated with the session identifier, and wherein the neighboring stationary wireless network access point is configured to generate a second unique mobile unit ID that differs the first mobile unit ID, but is likewise associated with the session identifier, in combination with other limitations.

3. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Duc Ho whose telephone number is (571) 272-3147. The examiner can normally be reached on Monday through Friday from 7:00 am to 3:30 pm.

If attempt to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Huy Vu, can be reached on (571) 272-3155.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (571) 272-2600.

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4. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Patent Examiner



Duc Ho

12-01-05